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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

JERRY.SHORMA@HP.COM

mkraft@hp.com

ipa.mail@hp.com

Office Action Summary

Application No.

10/632,132

Applicant(s)

CARROLL, JEREMY JOHN

Examiner

HILINA S. KASSA

Art Unit

2625

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 October 2008.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-14 and 18-23 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-14 and 18-23 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-8508)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Response to Arguments

1. Applicant's arguments filed on 10/22/2008 have been fully considered but they are not persuasive.

(1) argument 1:

Applicant argues that neither Owa et al. nor Van Oijen disclose "when one or more of the print jobs cannot be printed using said at least one printer on the basis of said plurality of different printing configurations, automatically determining at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said one or more print job(s), and performing such a reconfiguration of the printer configuration automatically or providing information to enable such a reconfiguration to be carried out manually"

With respect to Applicant's argument, Owa et al. disclose one or more of the print jobs cannot be printed using said at least one printer on the basis of said plurality of different printing configurations (**column 5, lines 45-57, note that the output destination printer selection determines which printer satisfies user's print conditions i.e. print configurations and if there are not printers exist, the printer is excluded and no print job is being processed**). Furthermore, Van

Oijen discloses automatically determining at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said one or more print job(s), **in column 5, lines 1-12, note that the printers are configured by user between automatic and manual print modes then the print job is carried out in accordance with the job specification.** Also, Van Oijen discloses performing such a reconfiguration of the printer configuration automatically or providing information to enable such a reconfiguration to be carried out manually, **in column 5, lines 12--20, note that it is checked if the manual printing mode is set or not based on the print conditions and the print job is carried out in accordance with the job specification.** Thus, the stated argument is taught by the combination of Owa et al. and Van Oijen.

(2) argument 2:

Applicant argues that neither Owa et al. nor Van Oijen disclose "when one or more of the print jobs cannot be printed using said printer(s) on the basis of said current printing configuration, to determine automatically at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said print job(s); and when said reconfiguration would require manual reconfiguration of said printer(s) by a user of the printing system, then use the printing system to generate and present to said user

instructions for manually reconfiguring said printer(s) prior to printing of the print job(s) by the printing system.”

With respect to Applicant's argument, Owa et al. disclose one or more of the print jobs cannot be printed using said printer(s) on the basis of said current printing configuration (**column 5, lines 45-57, note that the output destination printer selection determines which printer satisfies user's print conditions i.e. print configurations and if there are not printers exist, the printer is excluded and no print job is being processed**) to determine automatically at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said print job(s) (**column 6, lines 6-26; note that if there is no printer satisfying the printing requirements, an alternative condition gets checked and an alternative printer gets selected to process the print job**). Furthermore, Van Oijen discloses when said reconfiguration would require manual reconfiguration of said printer(s) by a user of the printing system, in **column 5, lines 16-20; note that the manual print mode is selected by the user**, then use the printing system to generate and present to said user instructions for manually reconfiguring said printer(s) prior to printing of the print job(s) by the printing system, in **column 5, lines 15-20, note that if the manual print mode is selected the printing system passes to the manual condition where the user can select a print command in order to**

carry out the printing process. Thus, the stated argument is taught by the combination of Owa et al. and Van Oijen.

(3) argument 3:

Applicant argues that neither Owa et al. nor Van Oijen disclose "when the print job cannot be printed using the one or more printers in their current printing configuration, automatically determine at least one reconfiguration of the one or more printers that would be capable of satisfying the printing requirements of said print job; and providing information to enable such a reconfiguration to be carried out by another"

With respect to Applicant's argument, Owa et al. disclose when the print job cannot be printed using the one or more printers in their current printing configuration (**column 5, lines 45-57; note that the printer which does not satisfy the printing requirement does not get selected so the print job does not get processed to be printed**), automatically determine at least one reconfiguration of the one or more printers that would be capable of satisfying the printing requirements of said print job (**column 5, lines 45-57; column 6, lines 6-12; note that the printer which does not satisfy the printing requirement does not get selected so the print job does not get processed to be printed but if it is determined that the one or more printer are to be selected, the information concerning the printer selection range narrowed down**

according to the condition items assigned i.e. configurations). Furthermore, Van Oijen discloses providing information to enable such a reconfiguration to be carried out by another **in column 5, lines 15-20; note that user can manually select conditions in order to process the print jobs. Also, the instruction is displaying in the screen of figure 3-7.** Thus, the stated argument is taught by the combination of Owa et al. and Van Oijen.

2. The argument presented on page 6 is identical as argument 3, except the claim is based on a computer readable medium. Thus, the same explanation that is presented for argument 3 is equally applicable for the argument presented on page 6.

Claim Rejections - 35 USC § 112

3. Claim 14 is rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Claim 14 claims **"a computer readable media"**, however, there is no support in the specification for having a computer readable media storing thereon a computer program to perform the desired claimed invention.

Claim Rejections - 35 USC § 101

4. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

5. Claim 14 is rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. Claim 14 is drawn to non-functional descriptive material.

MPEP 2106.01.V (Nonstatutory Subject Matter) states:

"When nonfunctional descriptive material is recorded on some computer-readable medium, it is not statutory since no requisite functionality is present to satisfy the practical application requirement".

Claim 14 currently recites **"a computer readable media having stored thereon a computer program"**. The 101 rejection made in the 6/6/07 OA was for the reason of "non-functional descriptive material". "When nonfunctional descriptive material i.e. "data carrier" is recorded on some computer-readable medium, it is not statutory since no requisite functionality is present to satisfy the practical application requirement", see MPEP 2106.01. Thus, treating claim 14 as a whole, it is non statutory.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 1-2,5-14 and 18-23 rejected under 35 U.S.C. 103(a) as being unpatentable over Owa et al. (US Patent Number 6,348,971 B2) in view of Van Oijen (US Patent Number 5,918,988).

(1) regarding claim 1:

As shown in figure 1, Owa et al. disclose a method of printing at least one print job in a computer-based printer system (**1, 5 figure 1, column 3, lines 16-22**), the system comprising at least one printer and at least one computer connected to said at least one printer (**column 3, lines 16-22; note that a host computer 1 and one or more of printers 5, 2a-2d are connected**), wherein the at least one printer has a plurality of different printing configurations (**column 3, lines 51-65; note that the printers have different configurations i.e. model names, performance, additional functions**) at least one of which is manually configurable (**column 3, line 66-column 4, line 5; note that user can also manually set up the desired configuration**) and the at least one computer is capable of generating said at least one print job (**11, figure 2, column 4, lines 44-52; note that the data transfer section 17 passes the print data generated by the print data generation section 18 to the operating system of the host computer1, for transferring the print data to the printer selected by the output destination printer selection section 11**), said at least one print job having corresponding printing requirements (**column 5, lines 1-8; note that such requirement is considered as a color/monochrome, paper size, resolution, double-side printing etc.**), each printing configuration being capable of satisfying one

or more printing requirements (**column 5, lines 16-20; note that for text printing the desired print quality and size gets satisfied by the selected printer**), the method comprising the steps of using the printing system to:

i) create one or more print jobs (**column 4, lines 44-48; print data gets generated**);

ii) determine whether or not the print job or each print job can be printed using said at least one printer by comparing the printing requirements of the print job or each print job and the current printing configurations of the at least one printer (**column 5, lines 30-44; note that the printer selection condition section compares the set up print conditions with the basic information of the printer**);

iii) when one of more of the print jobs cannot be printed using said at least one printer on the basis of said plurality of different printing configurations (**column 5, lines 45-57; note that the printer which does not satisfy the printing requirement does not get selected so the print job does not get processed to be printed**).

Owa et al. disclose all of the subject matter as described as above except for specifically teaching to automatically determining at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said one or more print job(s) and performing such a reconfiguration of the printer configuration automatically or providing information to enable such a reconfiguration to be carried out manually.

However, as shown in figures 1-2, Van Oijen teaches a printing system which receives print jobs then make manual and automatic configuration. Van Oijen also

discloses automatically determining at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said one or more print job(s) (**column 5, lines 1-12; note that the printer are configured based on the different requirements to selectively prints print jobs in dependence on the job specifications of the other jobs**) and performing such a reconfiguration of the printer configuration automatically or providing information to enable such a reconfiguration to be carried out manually (**column 5, lines 12-20; note that it is checked whether manual or automatic setting is set before manually setting the printer based on the print conditions. Then manual print mode gets selected for the print job to be carried out**).

Owa et al. and Van Oijen are combinable because they are from the same field of endeavor i.e. processing data for printer. At the time of the invention, it would have been obvious to a person of ordinary skilled in the art to automatically determining at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said one or more print job(s) and performing such a reconfiguration of the printer configuration automatically or providing information to enable such a reconfiguration to be carried out manually. The suggestion/motivation for doing so would have been to provide a printing system which can operate in different modes thus improving the possible uses and versatility of a printing system (column 1, lines 49-58). Therefore, it would have been obvious to combine Owa et al. with Van Oijen to obtain the invention as specified in claim 1.

(2) regarding claim 2:

Owa et al. disclose all of the subject matter as described as above except for specifically teaching to determine when said reconfiguration would require manual reconfiguration of said one or more printer(s) by a user of the printing system, and if so using the printing system to generate and present to said user instruction for manually reconfiguring said one or more printer(s) prior to printing of the print one or more job(s) by the printing system.

However, Van Oijen discloses to determine when said reconfiguration would require manual reconfiguration of said one or more printer(s) by a user of the printing system **(column 5, lines 12-15; note that it is checked whether manual or automatic setting is set before manually setting the printer based on the print conditions. Then manual print mode gets selected for the print job to be carried out)** and if so using the printing system to generate and present to said user instruction for manually reconfiguring said one or more printer(s) prior to printing of the print one or more job(s) by the printing system **(column 5, lines 15-20; note that user can manually select conditions in order to process the print jobs. Also, the instruction is displaying in the screen).**

Owa et al. and Van Oijen are combinable because they are from the same field of endeavor i.e. processing data for printer. At the time of the invention, it would have been obvious to a person of ordinary skilled in the art to determine when said reconfiguration would require manual reconfiguration of said one or more printer(s) by a user of the printing system, and if so using the printing system to generate and present

to said user instruction for manually reconfiguring said one or more printer(s) prior to printing of the print one or more job(s) by the printing system. The suggestion/motivation for doing so would have been to provide a printing system which can operate in different modes thus improving the possible uses and versatility of a printing system (column 1, lines 49-58). Therefore, it would have been obvious to combine Owa et al. with Van Oijen to obtain the invention as specified in claim 2.

(3) regarding claim 5:

Owa et al. further disclose a method as claimed in claim 1, in which there are a plurality of different preferred reconfigurations which would involve both manual configuration by the user (**column 5, line 64-column 6, line 5; note that if there is no printers to be selected based on the print requirements, a message gets displayed for the user to manually enter print conditions**) and automatic configuration by the printing system (**column 6, lines 6-26; note that if there is no printer satisfying the printing requirements, an alternative condition gets checked and an alternative printer gets selected to process the print job this configuration gets established without user's manual setting i.e. automatically**).

(4) regarding claim 6:

Owa et al. further disclose a method as claimed in claim 1, in which there are a plurality of different preferred reconfigurations, and prior to step iv) these preferred configurations are presented to user of the printing system so that the user can select a

particular reconfiguration, for which reconfiguration instructions are then presented in step iv) (**column 5, line 64-column 6, line 5; note that if there is no printers to be selected based on the print requirements, a message gets displayed for the user to manually enter print conditions**).

(5) regarding claim 7:

Owa et al. further disclose a method as claimed in claim 2, in which a computer includes a user display, and said presentation of instructions includes the display of reconfiguration instructions on the user display (**column 5, line 64-column 6, line 5; note that if there is no printers to be selected based on the print requirements, a message gets displayed for the user to manually enter print conditions**).

(6) regarding claim 8:

Owa et al. further disclose a method as claimed in claim 2, in which said presentation of instructions includes the printing of reconfiguration instructions on a printer (**column 7, lines 12-22**).

(7) regarding claim 9:

Owa et al. further disclose a method as claimed in claim 8, in which a computer includes a user display, in which said presentation of instructions includes a message displayed on the user display informing the user that reconfiguration instructions are to be printed on said printer (**column 7, lines 12-22; column 10, lines 35-43**).

(8) regarding claim 10:

Owa et al. further disclose a method as claimed claim 1, in which after reconfiguration of the printer(s) (**column 6, lines 6-12; note that the printers are selected based on the condition items assigned**), the print job is assigned to more than one printer (**column 6, lines 12-17; note that more than one printers are to be selected based on the information on each printer**), and the printing system presents to a user of the printing system instructions for any or all of locating, assembling, collating, binding, or otherwise combining material printed from the printers (**column 4, line 66-column 5, lines 5; note that print location is gets specified to user**).

(9) regarding claim 11:

Owa et al. further disclose a method as claimed in claim 10, in which the print job has a plurality of different parts (**column 8, lines 7-10**), each part having different printing requirements (**column 8, lines 14-24**), and the print job is split according to those different requirements (**column 8, lines 24-31**).

(10) regarding claim 12:

As shown in figure 1, Owa et al. disclose a computer-based printing system, the printing system comprising at least one printer and at least one computer connected to said printer(s) (**column 3, lines 16-22; note that a host computer 1 and one or more**

of printers 5, 2a-2d are connected), the or each printer having a plurality of different printing configurations (**column 3, lines 51-65; note that the printers have different configurations i.e. model names, performance, additional functions**) at least one of which is manually configurable (**column 3, line 66-column 4, line 5; note that user can also manually set up the desired configuration**) and the or each computer being capable of generating at least one print job (**11, figure 2, column 4, lines 44-52; note that the data transfer section 17 passes the print data generated by the print data generation section 18 to the operating system of the host computer¹, for transferring the print data to the printer selected by the output destination printer selection section 11**), said print job(s) having corresponding printing requirements (**column 5, lines 1-8; note that such requirement is considered as a color/monochrome, paper size, resolution, double-side printing etc.**), each printing configuration being capable of satisfying one or more printing requirements (**column 5, lines 16-20; note that for text printing the desired print quality and size gets satisfied by the selected printer**), wherein the printing system is arranged to:

determine whether or not each print job can be printed using said printer(s) by comparing the printing requirements of the or each print job and the current printing configurations of the printer(s) (**column 5, lines 30-44; note that the printer selection condition section compares the set up print conditions with the basic information of the printer**); and

when one or more of the print jobs cannot be printed using said printer(s) on the basis of said current printing configuration (**column 5, lines 45-57; note that the**

printer which does not satisfy the printing requirement does not get selected so the print job does not get processed to be printed), to determine automatically at least one reconfiguration of the printer configuration(s) that would be capable of satisfying the printing requirement(s) of said print job(s) (column 6, lines 6-26; note that if there is no printer satisfying the printing requirements, an alternative condition gets checked and an alternative printer gets selected to process the print job).

Owa et al. disclose all of the subject matter as described as above except for specifically teaching when said reconfiguration would require manual reconfiguration of said printer(s) by a user of the printing system, then use the printing system to generate and present to said user instructions for manually reconfiguring said printer(s) prior to printing of the print job(s) by the printing system

However, Van Oijen discloses when said reconfiguration would require manual reconfiguration of said one or more printer(s) by a user of the printing system (column 5, lines 12-15; **note that it is checked whether manual or automatic setting is set before manually setting the printer based on the print conditions. Then manual print mode gets selected for the print job to be carried out)** then use the printing system to generate and present to said user instruction for manually reconfiguring said one or more printer(s) prior to printing of the print one or more job(s) by the printing system (column 5, lines 15-20; **note that user can manually select conditions in order to process the print jobs. Also, the instruction is displaying in the screen).**

Owa et al. and Van Oijen are combinable because they are from the same field of endeavor i.e. processing data for printer. At the time of the invention, it would have been obvious to a person of ordinary skilled in the art when said reconfiguration would require manual reconfiguration of said one or more printer(s) by a user of the printing system, then use the printing system to generate and present to said user instruction for manually reconfiguring said one or more printer(s) prior to printing of the print one or more job(s) by the printing system. The suggestion/motivation for doing so would have been to provide a printing system which can operate in different modes thus improving the possible uses and versatility of a printing system (column 1, lines 49-58). Therefore, it would have been obvious to combine Owa et al. with Van Oijen to obtain the invention as specified in claim 12.

(11) regarding claim 13:

Owa et al. further disclose a computer system programmed for providing print job information to printers connected to the computer system by a computer network (column 3, lines 16-22; note that a host computer 1 and one or more of printers 5, 2a-2d are connected), wherein one or more processors of the computer system are programmed to:

create a print job (column 4, lines 44-48; print data gets generated);

determine whether or not the print job can be printed using one or more printers in communication with the computer system by comparing the printing requirements of the print job and the current printing configurations of the one or more printers (column

5, lines 30-44; note that the printer selection condition section compares the set up print conditions with the basic information of the printer);

when the print job cannot be printed using the one or more printers in their current printing configuration (**column 5, lines 45-57; note that the printer which does not satisfy the printing requirement does not get selected so the print job does not get processed to be printed**), automatically determine at least one reconfiguration of the one or more printers that would be capable of satisfying the printing requirements of said print job (**column 6, lines 6-26; note that if there is no printer satisfying the printing requirements, an alternative condition gets checked and an alternative printer gets selected to process the print job**); and

Owa et al. disclose all of the subject matter as described as above except for specifically teaching to provide information to enable such a reconfiguration to be carried out by another.

However, Van Oijen discloses to provide information to enable such a reconfiguration to be carried out by another (**column 5, lines 15-20; note that user can manually select conditions in order to process the print jobs. Also, the instruction is displaying in the screen**).

Owa et al. and Van Oijen are combinable because they are from the same field of endeavor i.e. processing data for printer. At the time of the invention, it would have been obvious to a person of ordinary skilled in the art to provide information to enable such a reconfiguration to be carried out by another. The suggestion/motivation for doing so would have been to provide a printing system which can operate in different modes

thus improving the possible uses and versatility of a printing system (column 1, lines 49-58). Therefore, it would have been obvious to combine Owa et al. with Van Oijen to obtain the invention as specified in claim 13.

(12) regarding claim 14:

As shown in figure 8, Owa et al. further disclose computer readable media having stored thereon a computer program containing code adapted to program one or more processors of a computer system to **(45, 41, 61 figure 8; column 9, lines 31-44; note that the print data generating system communicates with the printer):**

obtain current printing configurations of one or more printers in communication with the computer system **(column 9, lines 45-56; note that the printer driver generates print data to be output to the printer);**

determine whether or not a print job can be printed using such one or more printers by comparing the printing requirements of the print job and the current printing configuration of the one or more printers **(column 5, lines 30-44; note that the printer selection condition section compares the set up print conditions with the basic information of the printer);**

when the print job cannot be printed using the one or more printers in their current printing configuration **(column 5, lines 45-57; note that the printer which does not satisfy the printing requirement does not get selected so the print job does not get processed to be printed)**, automatically determine at least one reconfiguration of the one or more printers that would be capable of satisfying the

printing requirements of the print job (**column 6, lines 6-26; note that if there is no printer satisfying the printing requirements, an alternative condition gets checked and an alternative printer gets selected to process the print job**).

Owa et al. disclose all of the subject matter as described as above except for specifically teaching to perform such a reconfiguration of the one or more printers when such reconfiguration can be done automatically and providing information to enable such a reconfiguration to be carried out by another when such reconfiguration cannot be done automatically.

However, Van Oijen discloses to perform such a reconfiguration of the one or more printers when such reconfiguration can be done automatically and providing information to enable such a reconfiguration to be carried out by another when such reconfiguration cannot be done automatically (**column 5, lines 15-20; note that user can manually select conditions in order to process the print jobs. Also, the instruction is displaying in the screen**).

Owa et al. and Van Oijen are combinable because they are from the same field of endeavor i.e. processing data for printer. At the time of the invention, it would have been obvious to a person of ordinary skilled in the art to perform such a reconfiguration of the one or more printers when such reconfiguration can be done automatically and providing information to enable such a reconfiguration to be carried out by another when such reconfiguration cannot be done automatically. The suggestion/motivation for doing so would have been to provide a printing system which can operate in different modes thus improving the possible uses and versatility of a printing system (column 1, lines 49-

58). Therefore, it would have been obvious to combine Owa et al. with Van Oijen to obtain the invention as specified in claim 13.

(13) regarding claim 18:

Owa et al. further disclose a method as claimed in claim 1 wherein the at least one reconfiguration of the printer configuration(s) capable of satisfying the printing requirement(s) of said print job(s) is determined by automatically analyzing a set of plausible reconfigurations (**column 7, line 67-column 8, line 4; note that satisfying the conditions desired by the user i.e. a print installed at a close location and operating at high speed is considered as a plausible configuration**).

(14) regarding claim 19:

Owa et al. further disclose a method as claimed in claim 18 wherein the set of plausible reconfigurations is determined by iterating through features associated with said one or more printers (**column 7, lines 48-67; note that the scores associated with printers PRN1-PRN3 is described. Also, the scores are given according to the speed configuration of the printers which is considered as the iterating feature of printers based on their speed capacity**).

(15) regarding claim 20:

Owa et al. further disclose a computer-based printing system as claimed in claim 12 wherein the at least one reconfiguration of the printer configuration(s) capable of

satisfying the printing requirement(s) of said print job(s) is determined by automatically analyzing a set of plausible reconfigurations (**column 7, line 67-column 8, line 4; note that satisfying the conditions desired by the user i.e. a print installed at a close location and operating at high speed is considered as a plausible configuration**).

(16) regarding claim 21:

Owa et al. further disclose a computer-based printing system 20 wherein the set of plausible reconfigurations is determined by iterating through features associated with said one of more printers (**column 7, lines 48-67; note that the scores associated with printers PRN1-PRN3 is described. Also, the scores are given according to the speed configuration of the printers which is considered as the iterating feature of printers based on their speed capacity**).

(17) regarding claim 22:

Owa et al. further disclose a computer system as claimed in claim 13 wherein the at least one reconfiguration of the printer configuration of the printer configuration(s) capable of satisfying the printing requirements(s) of said print job(s) is determined by automatically analyzing a set of plausible reconfigurations (**column 7, line 67-column 8, line 4; note that satisfying the conditions desired by the user i.e. a print installed at a close location and operating at high speed is considered as a plausible configuration**).

(18) regarding claim 23:

Owa et al. further disclose a computer system 22 wherein the set of plausible reconfiguration is determined by iterating through features associated with said one or more printers (**column 7, lines 48-67; note that the scores associated with printers PRN1-PRN3 is described. Also, the scores are given according to the speed configuration of the printers which is considered as the iterating feature of printers based on their speed capacity**).

8. Claims 3 and 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Owa et al. (US Patent Number 6,348,971 B2) and Van Oijen (US Patent Number 5,918,988) as applied to claim 1 above, and further in view of Ueda et al. (US Patent Number 7,046,383 B1).

(1) regarding claim 3:

Owa et al. disclose a method as claimed in claim 1, in which the method involves prior to step iv) the steps of v) calculating an economic cost for effecting each of a plurality of possible reconfigurations for which the printer configuration(s) would be capable of satisfying the printing requirement (s) of said one or more print job(s) (**column 7, line 67-column 8, line 4; note that the printer most satisfying the conditions desired by users is selected automatically**); and vi) selecting according to the calculated economic costs one or more preferred reconfigurations of said one or more printer(s) for which reconfiguration instructions will be presented to said user

(column 7, lines 23-67; note that according to the scores given to printers PRN1-PRN3, user gets instructed or updated of the configurations).

Owa et al. and Van Oijen disclose all of the subject matter as described as above except for specifically teaching calculating an economic cost for effecting each of a plurality of possible reconfigurations and selecting to the calculated economic costs.

However, Ueda et al. teach calculating an economic cost for effecting each of a plurality of possible reconfigurations **(column 7, lines 41-59; note that a cost calculating means is informed of the performance of each printers beforehand and the display means displays the printers together with additional information or attributes particular thereto, such configurations also include cost, printing time, image quality/resolution etc.)** and selecting to the calculated economic costs **(column 5, lines 37-42, lines 48-54; note that the printer automatically gets selected based on the basis of printing cost).**

Owa et al., Van Oijen and Ueda et al. are combinable because they are from the same field of endeavor. At the time of the invention, it would have been obvious to a person of ordinary skilled in the art to calculate an economic cost for effecting each of a plurality of possible reconfigurations and select to the calculated economic costs. The suggestion/motivation for doing so would have been in order to select and efficiently utilize a printer with most advantageous print configuration and printing cost (abstract, lines 8-11). Therefore, it would have been obvious to combine Owa et al. and Van Oijen with Ueda et al. to obtain the invention as specified in claim 3.

(2) regarding claim 4:

Owa et al. and Van Oijen disclose all of the subject matter as described as above except for specifically teaching in which there are a plurality of preferred reconfigurations, and the reconfiguration information presented to said user includes the corresponding economic cost for each preferred configuration.

However, Ueda et al. teach in which there are a plurality of preferred reconfigurations (**column 7, lines 41-59; note that a cost calculating means is informed of the performance of each printers beforehand and the display means displays the printers together with additional information or attributes particular thereto, such configurations also include cost, printing time, image quality/resolution etc**), and the reconfiguration information presented to said user includes the corresponding economic cost for each preferred configuration (**column 5, lines 37-42, lines 48-54; note that the printer automatically gets selected based on the basis of printing cost**).

Owa et al., Van Oijen and Ueda et al. are combinable because they are from the same field of endeavor. At the time of the invention, it would have been obvious to a person of ordinary skilled in the art to calculate an economic cost for effecting each of a plurality of possible reconfigurations and select to the calculated economic costs. The suggestion/motivation for doing so would have been in order to select and efficiently utilize a printer with most advantageous print configuration and printing cost (abstract, lines 8-11). Therefore, it would have been obvious to combine Owa et al. and Van Oijen with Ueda et al. to obtain the invention as specified in claim 4.

Conclusion

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

10. Any inquiry concerning this communication or earlier communication from the examiner should be directed to Hilina Kassa whose telephone number is (571) 270-1676.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Moore could be reached at (571) 272- 7437. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about PAIR system, see <http://pari-direct.uspto.gov>. Should you have

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questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Hilina S Kassa/
Examiner, Art Unit 2625
January 6, 2009

/David K Moore/
Supervisory Patent Examiner, Art Unit 2625